OPERATIONAL GROUPS AND INNOVATIVE PROJECTS

OPERATIONAL GROUPS AND INNOVATIVE PROJECTS

Improvements in Forest Management

EsRuralEsVital

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EsRuralEsVital

Introduction

This publication is a compilation of **Operational Groups and Innovative Projects for improvements in forest management** carried out in Spain and Europe. **The National Rural Network, NRN** has been entrusted with creating this publication to meet its purpose of **disseminating and raising awareness about innovative initiatives and fostering knowledge exchange and transfer** from the sphere of research to practical applications.

Innovation is a fundamental instrument in all areas, but especially in rural areas since this is a disperse environment with difficult access to knowledge, the results from research, training, market developments and new technologies. The main instrument to promote innovation in rural areas is the **European Innovation Partnership for agricultural productivity and sustainability (EIP-AGRI)**. The EIP-AGRI aims to **speed up innovation in the agri-food and forestry sector**, and therefore in rural areas, as well as to **disseminate successful examples of experience in the territory** through specific innovative projects. In addition, it seeks to match the range of science available to the demand from different sectors and help solve specific problems or make the most of opportunities in order to help increase competitiveness and improve living conditions in rural areas.

The Operational Groups (OGs) are groups of stakeholders from different sectors: agriculture, livestock, forestry, agri-food and forest-based industries, from public or private R&D&I training and consultancy centres, technology centres, non-profit institutions, and more. These parties get together to solve a problem or make the most of an opportunity using an innovative, multisectoral and collaborative approach via an innovative project. **Their work is subsidised by EAFRD** through national and regional rural development programmes to set up the group and prepare its innovation project, as well as to implement it.

Furthermore, in the European context, there are also other policies with synergies appearing out of their commitment to innovation in rural areas. **The Horizon 2020 research framework programme** covers matters related to the agri-food and forestry sectors. Under this umbrella, there are thematic networks like **the ERA-NET programme** and research projects.

This dossier presents the results from the exchange of experience between **Operational Groups and Innovative Projects on improvements in forest management,** organised by the NRN. It includes information units describing the Operational Groups and Innovative Projects, fostered by Measure 16 of the rural development programme in Spain in this matter, thematic networks and Horizon 2020 projects, with the aim of helping disseminate them and enabling the different stakeholders to consult them.

Exchange of experiences between Operational Groups and Innovative Projects on the theme of improvements in forest management

On 19 November 2020, the National Rural Network (NRN) organised an exchange of experience between Operational Groups, Innovative Projects and others from Horizon 2020 and the ERA-NET programme that are working on the matter of improvements in forest management. The exchange took place via a virtual meeting attended by more than 60 people representing research centres, companies, public government administrations, agricultural and environmental organisations, cooperatives, rural development groups and associations for social action.

Objectives addressed:

The meeting was held with the following objectives:

- To foster the creation of networks and synergies between collectives and entities who work or have an interest in improving forest management.

- To help exchange information and the results obtained by the different Operational Groups and Innovative Projects within the EAFRD, the H2020 European research programme and the ERA-NET programme related to this topic.

- To raise visibility about the innovation work done by the Operational Groups and Innovative Projects in the forestry sector.
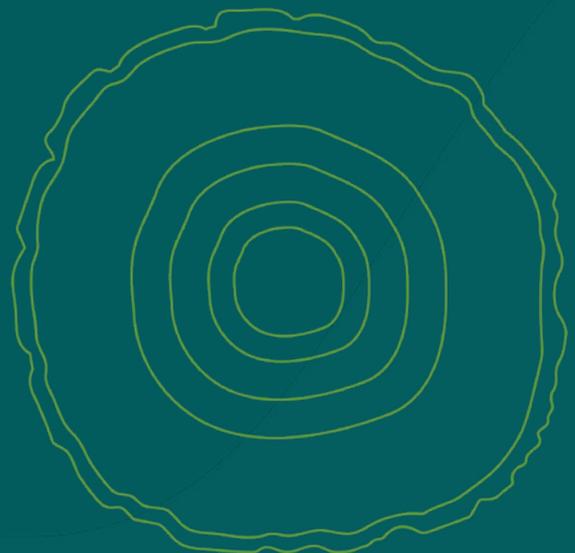
Conference held in two stages:

- An analysis was made of the work being carried out by the NRN as regards disseminating the work by the Operational Groups and the Innovative Projects. Furthermore, the innovative measures in rural development programmes and from the H2020 Programme promoted by EIP-Agri were also examined. Finally, the challenges facing the sector as regards the provisions of the **European strategic framework** in the **matter of climate change** were explained.

- In order to bring about an exchange of innovative solutions in the sphere of forest management, the attendees saw presentations by nine Operational Groups, Innovative Projects and projects from the H2020 and ERA-NET programmes, given in three parallel sessions, after which the key points discussed in each room were shared.

Key ideas:

- It was found that one of the challenges facing the sector is **improvement in managing the efficiency of forest management**. Innovation is crucial in achieving this. The forestry sector is fully committed to a fast-track process of getting up-to-date and adapting to a digital model, which is noteworthy for introducing information and communications technologies.

- The importance of forestry projects for rural areas has been stressed in environmental terms with their positive impact on the climate, in economic terms by ensuring the sector's profitability, and in social terms by encouraging the population to settle.

- New techniques are being developed to meet this challenge via the Operational Groups and Innovative Projects. The high technical level of the projects that are being carried out has been verified, providing sophisticated solutions in terms of digitalisation, planning and forest management. They have also contributed **solutions to introduce the environmental aspect** into the projects.
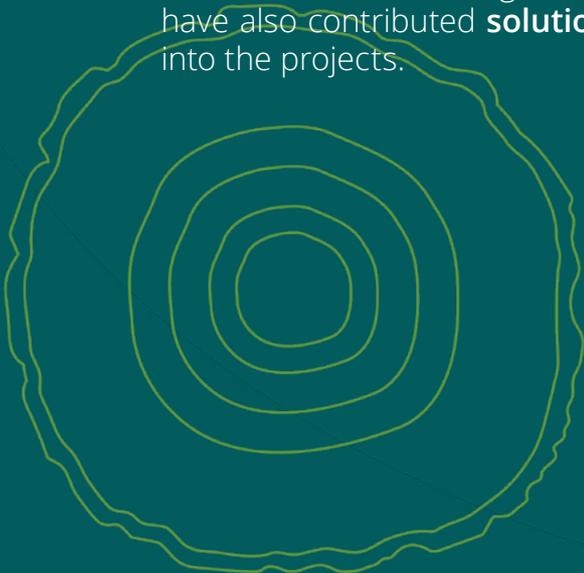
- Innovation is important to benefit forest managers, adapting to their needs and resources and including them in decision-making.

- There is growing awareness of the need to inform and train forest managers, creating links between the academic research sector and the forest workers themselves.

- These experience exchanges help foster innovative activities that have had a positive impact, so that they can be replicated in other territories and sectors with similar needs.

For more information about the conference, click here

TIMBERTRACK: An innovative labelling system for tracking timber from the forest to industry

1

RURAL DEVELOPMENT PROGRAMME
NRDP

YEAR CREATED
2018

PROJECT COORDINATOR
Sistemas de Desarrollo Integral del Territorio S.L. (FMC)

PARTNERS

FMC | Emergya Ingeniería S.L. | Centro Tecnológico Metalmecánico y del Transporte (CETEMET) Clúster da Madeira e o Deseño de Galicia (CMD) | Tag Ingenieros Consultores S.L. Financiera Maderera S.A. (FINSA) Dingoma S.A.

TIMBERTRACK

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Objectives

- A labelling solution for units of material and batches of timber.ches of timber.
- Development of the complementary elements that enable it to be integrated into the forestry machinery currently used in the work of timber exploitation and logistics
- Creation of a plan to apply the technological solution to the sector, allowing for a gradual transition and integration with the data systems.

Expected results

- To develop a blockchain solution to make the Spanish forestry sector more efficient.
- To develop a label or brand based on any of the existing technologies, paying special attention to RFID (radio frequency), which is technically and economically viable for the sector.
- To implement recorders and readers which, once installed in the forestry machinery in use, will enable automatic labelling and marking to be carried out, as well as label reading.
- To draw up the sectoral implementation plan, ready to be applied. This plan will take into account all of the parties in the supply chain, successfully guiding the implementation process.

"The innovation to be developed is directly related to the timber and forestry industry, since it is intended to develop a labelling system for the sector".

Description

Raw wood, which is the raw material for the processing industry, is not controlled with the sufficient precision that can be provided today with state-of-the-art modern technologies. This means that a huge amount of data taken by the machinery is not being properly exploited by the industry, from producers to transformers.

Furthermore, the advances in information technology are not being exploited in the forestry sector. A labelling system for logs and batches enables all of the information collected by the forest machinery to be exploited for the benefit of the industry and society in general.

TIMBERTRACK aims to design and develop a labelling system to identify the timber as a raw material, enabling exploitation of the entire set of data generated throughout the supply chain by all of the machinery involved in it. Labelling raw timber means its traceability can be controlled, as well as introducing it into advanced data systems.

With this tool, forest certification will be more accessible both for forest owners and for primary and secondary processing forest-based industries.

Operational Group and Innovative Project

CHAINWOOD: Blockchain in the timber sector

2

RURAL DEVELOPMENT PROGRAMME
NRDP

YEAR CREATED
2018

PROJECT COORDINATOR
Sistemas de Desarrollo Integral del Territorio S.L. (FMC)

PARTNERS

Agresta S. Coop. | Sistemas de Desarrollo Integral del Territorio S.L. (FMC) | Accuro Technology S.L. | Fundación Centro Tecnológico Forestal y de la Madera (CETEMAS) Clúster da Madeira e o Deseño de Galicia (CMD) | Fundación Corporación Tecnológica de Andalucía (CTA) | Emergya Ingeniería S.L. Federación de Asociaciones Forestales de Castilla y León (FAFCYLE) | Maderas Siero S.A.

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Description

The project aims to help solve many of the limitations in the different wood supply chains in Spain that hinder their modernisation and improvement in terms of efficiency and access to information, specifically in the segment of the chain between the forest and the primary processing industry.

The operational group boasts capacities from the timber and forestry sector with companies and technology centres to develop software that will apply blockchain technology to the supply chain.

ChainWood includes activities for companies in the sector, forest owners and associations to make use of its outcomes, as well as pilot trials of the Internet platform and the app in collaborating companies in Castilla y León (poplar), Asturias (chestnut) and Galicia (oak).

Objectives

- Adapting the technological solution to all of the products resulting from this industry (solid wood, disintegration, cellulose pulp and biomass).

- Achieving a cost improvement for all stakeholders, more efficient work, transparent data flow and a better use of the available information.

- Greater trust between stakeholders in the chain by using blockchain technology and fostering access for new parties in the market, improving competition

Results achieved

▶ Development of a blockchain-based software infrastructure to secure the timber supply and value chain throughout the sector and open it up to all interested parties.

▶ Widespread dissemination of the results to more than 120 stakeholders in the forestry sector.

▶ The trials carried out (purchase and sale transactions, auctions and management of purchased batches) have shown the usefulness and speed of communication between the different links in the chain.

"There are many benefits with this solution: more transparent access to the market and better supply for producers, real-time guarantees about the state of the product for the industry, greater efficiency in logistics services, more precise information and an improvement in procedures for control and certification".

Planting forests

3

RURAL DEVELOPMENT PROGRAMME
NRDP

YEAR CREATED
2018

PROJECT COORDINATOR
Asociación Nacional de Empresas Forestales
(ASEMFO)

PARTNERS

ASEMFO | Grupo Sylvestris S.L. | Fundación Capacis | Instituto Nacional de Investigación y Tecnología Agraria y Alimentaria (INIA)   MAG Auditores S.L.P. | Verdes Digitales S.C.P.

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Expected results

▶ Development of innovative forest planting techniques and disseminate them.

▶ Creation of resilient forests that capture CO2, fight climate change and in future provide biomass, creating a circular economy.

"One of the tasks being carried out within this project has been to create a collaborative map where anyone can collect and share the spaces degraded by fires, and can propose restoration by forest planting".

Description

Half of Spain's area is covered with forests and they are a fundamental feature in the fight against climate change, since they capture atmospheric CO2. They are also a rich source of resources such as biomass, timber, cork, resin and berries. Over the past decade, an average area of 100,000 hectares has caught fire in Spain, a third of which is tree-covered, either due to human activity or natural causes. The Planting ForestsForest Planting Operational Group provides an innovative cost-efficient solution to restore the countryside devastated by fires with new forest planting techniques. The way of working is simple and gives great benefits locally. First, native species' seeds are collected from the regions affected. Then, work is done with them in a specialised laboratory to optimise their germination and rooting after they are sown, giving rise to a quality forest with resilient species that grow deep roots and are better adapted to the area. Restoring these spaces helps native species to regenerate faster, settling in the territory and fostering the appearance of other species of flora and the return of fauna to its natural habitat.

Objectives

● An increase in the restored area of burned-down forest.

● Encouraging and implementing reforestation techniques that are 50% cheaper.

● Fostering and bolstering green jobs.

SAGEFER: Integrated system of forest management support in a network

4

RURAL DEVELOPMENT PROGRAMME
NRDP

YEAR CREATED
2018

PROJECT COORDINATOR
Sistemas de Desarrollo Integral
del Territorio S.L. (FMC)

PARTNERS

FMC | Asociación Española para la Sostenibilidad Forestal |Federación de Asociaciones Forestales de Castilla y León Sistemas de Información Territorial para el Desarrollo Local | Centro de Observación y Teledetección Espacial S.A.U. | Universidad de Santiago de Compostela | Asociación de municipios para el Desarrollo Rural Integral de la Serranía Suroeste Sevillana

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Description

The resource of forests in Spain is clearly underused, with serious consequences in terms of the environment, economy, population, culture and more.

There is a need to implement tools and solutions to foster and boost their comprehensive development, involving the greatest number of parties in a resource that is already greatly scattered. The solution this project puts forward seeks to standardise a model based on GIS technology (geographical information systems), which will enable forest resources to be revitalised and boosted throughout Spain.

This model will be made up of a set of elements (procedures, processes, records, documents and formats), including each and every one of the elements considered to be essential for optimal development of forest resources in a territory (timber, resin, honey, mushrooms, cork, aromatic plants, ecosystem services, etc.), involving all socioeconomic parties related to forest resources (owners, forest communities, companies, public administrations, professionals, R&D&I, etc.).

Objectives

- Creation of a forest revitalisation service backed by an innovative framework and a specialised IT tool to improve the current situation of the forestry sector in Spain.

- Help in coordinating all of the parties related to forestry resources, achieving concrete, measurable results.

Expected results

▶ A wide variety of activities and initiatives launched to revitalise and support forestry management and exploitation with all of the stakeholders involved.

▶ Implementation of successful pilot projects to be replicated throughout the territory.

▶ Development and implementation of the IT application based on GIS technology, providing support to achieve sustainable, comprehensive management of forestry resources in the territories where it is introduced.

"The SAGEFER operational group and the specialised IT tool of the same name arose from the need to create a solution to boost forestry resources and improve the current situation of abandonment of forested areas".

Operational Group

EUCALIPTUS: Innovative project to improve forest productivity for *Eucalyptus globulus*

5

RURAL DEVELOPMENT PROGRAMME
RDP Asturias

YEAR CREATED
2019

PROJECT COORDINATOR
Coviastur S.L.

PARTNERS

Coviastur S.L. | Forestal Malleza S.L.
Ence Energía y Celulosa S.A. | Asociación Asturiana de Empresarios Forestales
(ASMADERA) | Asociación de Propietarios Forestales de Asturias (PROFOAS) | Fundación Centro Tecnológico Forestal y de la Madera (CETEMAS)

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Description

The eucalyptus tree (Eucalyptus globulus) is a pillar of the Asturian forestry sector, producing 70% of the wood that is cut down each year while occupying only 8% of the forested area of the autonomous community region (60,000 hectares). However, in Asturias more than twice the amount of eucalyptus wood that is cut down is processed. Some of the plantations in the region are suffering from various problems such as abandonment, lack of forestry management by some owners, fragmentation of the management, exhaustion of stumps after intensive rotations, etc.

This situation leads to economic problems of profitability, as well as environmental and social challenges. This project is intended to provide solutions for sustainable cultivation of eucalyptus in Asturias, by searching for innovative models of private property management and applying solutions to structural problems associated with revamping management and improving forests' productivity.

On the one hand, boilerplate contracts for collaboration between owners are being drawn up, involving them in drafting them to suit their needs and true situations. On the other, a free-access Internet platform will be developed based on ICT tools, containing information and audiovisuals on good practices and forestry. This platform will also enable virtual interaction between owners, managers and forestry companies.

Objectives

- A search for innovative models of private property management with participation from the owners.

- An improvement in forest productivity by optimising the nutritional management of plantations.

- Developing an Internet platform for sustainable eucalyptus forest management that is accessible to forest owners, forestry companies, forest managers and industry.

Expected results

▶ A proposal for a model of forestry company for Asturias based on a legal technical analysis and consultations with forest owners.

▶ Pilot trials held to improve forest productivity.

▶ Dissemination of good practices in forest management, enabling knowledge exchange between stakeholders in the sector through a free-access Internet platform with information and audiovisuals about eucalyptus forestry.

"In order to improve forest productivity, experimental trials will be made of fertilisation and forest improvement activities, as well as nutritional evaluations and dendrometric inventories".

Operational Group

MIKOGEST: Innovative dynamic management of mycological resources

6

RURAL DEVELOPMENT PROGRAMME
RDP Asturias

YEAR CREATED
2020

PROJECT COORDINATOR
Fundación Centro de Servicios y Promoción Forestal y de su Industria de Castilla y León (CESEFOR)

PARTNERS

CESEFOR | Centro de Ciencia y Tecnología Forestal de Cataluña (CTFC) | Federación de Asociaciones Forestales de Castilla y León (FAFCYLE) | Federación Española de Empresarios de Setas y Trufas (FETRUSE) Confederación de Organizaciones de Selvicultores de España (COSE)

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Description

The great demand for consumption of wild mushrooms, both internally and externally, is helping commercialisation of this product, with numerous companies located in Spain's main production areas and new ones being created. However, there are frequent shortages of these products that are often due to inefficient management of information and resources. The MIKOGEST project aims to innovate in managing the mycological resource through a system to regulate harvesting, allowing everyone to carry out sustainable, efficient work that gives the utmost added value.

For this reason, the Smartbasket mobile app has been created, aimed at any user who picks mushrooms and also at professionals with extensive knowledge of mycology. The app is intended to open up an information channel with society to raise awareness about the need to respect, care for and protect our mycological resources.

Its purpose is also to stimulate active collaboration in gathering data on the ground from ramblers and mushroom pickers on their walks through the countryside, providing valuable information for researchers, who help conserve the resource and improve knowledge about it. Smartbasket differs from other similar apps in that it provides mushroom pickers with a tool to identify species they find in the field but which they do not know, thanks to its visual identification function.

Objectives

- An estimation of mushroom productivity and projections so as to take decisions to ensure sustainable management of the natural environment.

- M anagement criteria established to guarantee the resource's sustainability and traceability.

- Professionalisation of harvesting and fostering of mushroom collector associations.

Expected results

- Implementation of innovative techniques to guarantee the environmental, social and economic sustainability of the mycological resource.

- An increase in traceability in the value chain by creating an app to provide accessible information for collectors and for the business sector.

"For decision-making that guarantees sustainable management for the natural environment, we will use ICTs as tools to estimate productivity and its future projections".

Restructuring of quality timber exploitation and the process of classifying it

7

RURAL DEVELOPMENT PROGRAMME
RDP Cataluña

YEAR CREATED
2015

PROJECT COORDINATOR
Asociación de propietarios forestales del Montnegre y del Corredor

PARTNERS

CTFC | B720 Fermín Vázquez Arquitecto
BDU, espacios de valor |
Individual forest owners

ASSOCIACIÓ DE PROPIETARIS FORESTALS
DEL MONTNEGRE I EL CORREDOR

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lguitart@montnegrecorredor.org

Description

In recent decades, most hardwood usage has been to obtain products of low added value like firewood or biofuels in general, reducing the potential profitability from exploitation and the forest's complexity.

The operational group has been created to find a demonstrable action to enable local quality hardwood species to be appreciated and promote their presence within the **Natura 2000 network.**

Objectives

- Guiding forest exploitation towards product diversification and obtaining quality products.
- Improved logistical efficiency.
- A study of the distribution chain in local markets.
- A response to the concerns of designers and manufacturers of street furniture regarding wood.

Results achieved

- ▶ A children's playground created in the Montnegre Corridor made of local wood free of chemical treatment.

- ▶ A study on the distribution chain and identification of the limitations and needs in each step.

- ▶ Implementation of new wood classification systems,

as in other European countries.

- ▶ New projects launched to foster the creation of quality products in forestry, handling small volumes.

"Throughout the project, we noticed the good suitability of local wood for making quality products and the need to search for niche markets".

Innovation in the product, processing and marketing to introduce local timbers with special characteristics into the Catalan market

8

RURAL DEVELOPMENT PROGRAMME
RDP - Cataluña

YEAR CREATED
2017

PROJECT COORDINATOR
Forestal de Catalunya SCCL

PARTNERS

Consorci Forestal de Catalunya | Associació de propietaris del Montnegre i el Corredor Agrupació Forestal del Montnegre i el Corredor S.L. MADEGESA | Forest Bioengineering Solutions S.A. | CTFC

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Description

In Catalan forests, there are species with unique characteristics (large size or with defects such as cankers, knots, holes, etc.) that can be interesting to manufacture inimitable products and decorative elements. Such pieces do not currently have a market price or else they are used for biofuels or packaging. Given this context, an operational group has been created and an innovative project is being carried out to put a new product on the market (local wood planks with special characteristics): studying the product, processing and marketing.

Objectives

- A new product placed on the market: wood with special characteristics, from proximity sources and sustainable management.

- A boost to appreciation for the value of quality wood from Catalan forests.

- Creation of a structure for work from the producer to the end customer.

- Identification of constraints and opportunities.

- Fostering groups of forestry producers.

Expected results

▶ Preliminary market study: verification of a market niche for these types of products.

▶ A study on the product: planks in the shape of a deconstructed log ("boule"): definition of species, dimensions, elements of value, etc.

▶ A study on the process: purchasing, sawing and storage of 100 m3 of wood.

▶ Development of a website to sell the product.

"Throughout the project we have seen a growing interest in this type of product and the necessary collaboration between producers and processors".

RESINEX: Knowledge transfer, professionalisation and innovation in the resin sector in Extremadura

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RURAL DEVELOPMENT PROGRAMME
RDP Extremadura

YEAR CREATED
2017

YEAR IMPLEMENTED
2019

PROJECT COORDINATOR
Jardinería Técnica Norte Extremeña S.L.

PARTNERS

Jardinería Técnica Norte Extremeña Recursos Forestales S.L. | Ambienta Ingeniería y Servicios Agrarios y Forestales S.L.U. | Jobosa Obras y Servicios S.L.U. | Asociación para el Desarrollo Integral de Sierra de Gata (ADISGATA) | Asociación para el Desarrollo Integral de la Comarca de las Hurdes (ADIC-HURDES)

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Description

In recent years, Extremadura has been promoting the use of resin in various areas with the aim of creating jobs to help alleviate depopulation in rural areas and improve forest management in them. The autonomous community region has great potential, with 86,851 hectares of maritime pine (*Pinus pinaster*) throughout the region. However, productivity today is far from economically profitable.

Resin collection in Extremadura faces challenges such as in optimising production and forest management, which includes the activity as a sustainable form of exploitation, or training for resin workers.

The Resinex Operational Group's innovation project aims to transfer technology and disseminate innovative techniques throughout the sector, adapting them to Extremadura's conditions for handling and sustainably managing resin pine forests.

Objectives

- Professionalisation of Extremadura's resin workers through technology transfer and the dissemination of innovative techniques adapted to environmentally sustainable conditions in Extremadura.

- Technology transfer, improvement and innovation in resin production and collection processes, all aimed at optimising production.

- Fostering improvement in forestry planning to introduce work with resin in the management and organisation of our forests, as well as integrating resin collectors as another stakeholder in forest management.

Expected results

▶ Fostering job creation and population settling in rural areas.

▶ Promotion and visibility for the resin sector, raising awareness of the importance of the countryside as a livelihood for families linked to such territories.

▶ A reduction in resin imports by increasing Spanish production.

▶ A decrease in the volume of biomass accumulating in the area's countryside.

"Greater dissemination and communication are necessary to raise awareness about the multi-purpose nature and diversity of the forestry sector, as well as its potential for sustainable management of forest resources and attaining an economic yield for the territory".

RESDRON: New applied technologies and resin exploitation in Galicia's interior

10

RURAL DEVELOPMENT PROGRAMME
RDP - Galicia

YEAR CREATED
2018

PROJECT COORDINATOR
Extracción de Resina Roberto Touza

PARTNERS

Misión Biológica de Galicia (MGB) del Consejo Superior de Investigaciones Científicas (CSIC)
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Description

Over the last five years, Galicia has gone from producing 1,000 kg of resin to 130,000 kg. Similarly, the number of professionals working in this sector has risen from one to fifteen people.

The growth seen in this activity has aroused the interest of public administrations and companies in helping to recuperate the resin sector in Galicia.

RESDRON intends to design a system to enable the most suitable pine trees for extracting resin to be identified with drones from the air.

During the research, the physiological parameters of the trees most apt for resin extraction were analysed in correspondence with the multispectral images captured by the drones. Subsequently, micro-resin extractions were taken from the chosen specimens and their parameters studied to associate them with the quality of the resin. Finally, a complete resin extraction was carried out and, with all of this information, an aerial identification system was designed.

Objectives

- An analysis of the variables involved in producing resin, both intrinsically in the tree such as its age, slenderness and diameter, and associated with the extraction procedure such as the orientation or when the incision is made.

- Creation of an innovative, simple and fast method to estimate the production potential of pine trees, known as "micro-resin extraction".

- Calibrating the use of multispectral images taken from drones to assess pine forests' resin potential.

Expected results

- ► Job creation.
- ► Increased profitability and competitiveness for forest management.
- ► Settling rural population.
- ► Maintaining and monitoring forests, preventing fires from occurring.

"The reflection of light in pine trees' needles is an indicator of the trees' physiological state. Multispectral images collected with cameras on drones enable us to calculate indices that we can associated with the trees' resin potential".

Operational Group and Innovative Project

Sustainability assessment system for the forestry sector in the Basque Country

11

RURAL DEVELOPMENT PROGRAMME
RDP País Vasco

YEAR CREATED
2017

PROJECT COORDINATOR
Asociación de la madera de Euskadi
(BASKEGUR)

PARTNERS

BASKEGUR | Instituto Vasco de Investigación
y Desarrollo Agrario (NEIKER-TECNALIA)
Ingurumenaren Kideak
Ingeniería S.L. (IK INGENIERÍA) | Egoin S.A.
Protec S.L. | Ebaki XXI S.A.

https://baskegur.eus/

jazpitarte@baskegur.org

- Validation of the environmental, social and economic indicators in line with the SDGs as a tool to boost consumption of a sustainably obtained local product.

Description

In recent years, a greater awareness among consumers and the verification that humans are having environmental effects on the planet are leading to the appearance of a new consumer increasingly sensitive to this problem. As a result, the environmental aspect is becoming a decisive factor in choosing and buying a product.

This project aims to draw up a panel of indicators to serve two purposes: on the one hand, to give the sector a method for calculating sustainability indicators to appreciate the forestry and timber sector of the Autonomous Community region of the Basque Country (CAPV), and on the other, to define measurable indicators to enable us to see how the sector is complying with the Sustainable Development Goals (SDGs), on an ongoing basis.

Objectives

- Definition of objective, demonstrable criteria to evaluate the sustainability of the entire value chain of the forestry and timber sector in a standardised way, which in turn should provide information and training about aspects of economic, social and environmental sustainability for all of the stakeholders involved.

Results achieved

▶ A diagnosis of the environmental, economic and social problems of the forestry sector in the Basque Country and a definition of 50 sustainability indicators in line with the SDGs.

▶ Validation of the indicators in different pilot projects and implementation of a specific information-gathering system to evaluate sustainability.

▶ A plan has been drawn up to improve the socioeconomic and environmental sustainability of the forestry sector.

"This project has been chosen to form part of the Ministry of Agriculture, Fisheries and Food's catalogue of good practices to improve the quality and sustainability of the forestry sector".

FORESTMAP: Quick and cost-effective integrated web platform for forest inventories

12

H2020 RESEARCH AND INNOVATION PROGRAMME

YEAR CREATED
2019

PROJECT COORDINATOR
Agresta S. Coop.

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Description

Forest inventories have always depended on fieldwork in order to achieve good accuracy to be used as a management tool. This situation has led to greater costs and delivery times. ForestMap is an innovative, open science (inventory technology based on cloud computing and remote sensing) platform that provides a digital service to draw up forest inventories more cheaply, quickly and reliably, allowing costs to be reduced by as much as 85% compared to traditional inventories.

By combining different sources of pre-processed remote sensing data (mainly of the LIDAR type), satellite images and photogrammetry, a series of algorithms are generated that enable forest inventories to be created that are adapted to the needs of users, such as forest owners and forest farmers. The platform is currently working in 12 Spanish provinces and covers over 3 million hectares. Some pilot zones have also been developed in Portugal, France, Italy, Germany, Finland and Slovenia.

Objectives

- Increased competitiveness of forestry SMEs by providing a tool to help stimulate the wood sector.
- A contribution to the growth of the European forestry sector, improving forestry management, stimulating the market and creating new jobs.

Expected results

▶ Fast, cheap and reliable preparation of forest inventories.

▶ Greater stimulation for the wood sector.

▶ A high-tech, cost-efficient tool enabling an improvement in traceability, transparency and efficiency in the forestry sector available for forest owners, forest managers and the forestry industry.

"The platform estimates all of the relevant variables in a professional forest inventory, thanks to a combination of pre-processed remote sensing data and powerful prediction models".

SUMFOREST: Sustainable forest management multifunctional forestry

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ERA-NET PROGRAMME

YEAR CREATED
2014

PROJECT COORDINATOR
Federal Ministry of Agriculture, Forestry, Environment and Water Management (BMLFUW)

PARTNERS

AT: BMLFUW | **CH:** FOEN | **DE:** BMEL
ES: CIFOR – INIA, AEI | **FI:** MMM
FR: ECOFOR | **GR:** DUTH | **IE:** DAFM | **LT:** AM
LV: LAAFS | **MK:** UKIM | **NO:** RCN | **PL:** IBL
SE: FORMAS | **UK:** FC | **SI:** MESCS, MAFF
IT: MIPAAF | **SK:** MPRV SR | European Forest Institute (EFI) | Nordic Forest Research Cooperation Committee (SNS)

www.cordis.europa.eu/project
info@efi.int

Description

Today, the significant changes in the environment, society, the economy, climate and land use all pose new challenges to meeting the multifunctional demands of European forest resources and their sustainable management.

European forests are made up of a great diversity of forest ecosystems and tree species that are affected differently by climate change and land use. Within this context, this project aims to bolster scientific cooperation on European forests by creating a multi-party network (national and regional public authorities, centres of forestry excellence)) in Europe that collaborates in a research area on sustainable, functional forestry.

This network, called ERA-NET, also aims to enable the new cooperation agreements to be drawn up with other regions like Russia in order to reduce fragmentation and maximise the impact of research activities on sustainable forestry management and multifunctional forestry. Similarly, the network will also make it possible to publish joint tenders for research projects and cooperatively finance the ones chosen.

Objectives

- A key role played in harmonising existing and future research programmes.

- Support for political decisions concerning sustainable forest management and multifunctional forestry.

- A deeper understanding of the concepts of sustainability and multifunctionality in the sphere of forestry.

- Development of a comprehensive method for mapping forestry research capacities and transnational cooperation.

Expected results

- Creation of a forestry research network to fund seven R&D&I projects.

- A summer school to be held for young researchers.

- Cooperation to be set up with Russia and Eastern European countries.

- Production of a guide to European mobility programmes in the forestry sector.

"This project sets up a network bringing together 23 key stakeholders from 15 European Member States, 3 Associated States and 2 international institutions".

EsRuralEsVital

The NRN is the hub connecting all of the people and entities related to the rural environment with the aim of raising awareness of Rural Development Programmes and providing access to them. At the same time, its purpose is to make the population aware of the importance of the rural environment for our present and our future.

The unit responsible for the NRN is the Subdirectorate General for Rural Revitalization within the Directorate General of Rural Development, Innovation and Agrifood Training of the Ministry of Agriculture, Fisheries and Food.

EsRuralEsVital

IMPROVEMENTS IN FOREST MANAGEMENT